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## Butler County

### Estimated Economic Impact of Agriculture, Food, and Food Processing Sectors

A total of 19 agriculture, food, and food processing sectors were analyzed to determine their overall contribution to the Butler County economy.<sup>1</sup> These 19 sectors have a total direct output of approximately \$373 million and support 2,341.5 jobs in Butler County. Running the model for all 19 sectors simultaneously produces the following results:

#### Agriculture Contribution in Butler County

Impact Type <sup>2</sup>	Employment	% of Total Employment	Total Value Added <sup>3</sup>	% of Gross Regional Product <sup>4</sup>	Output <sup>5</sup>	% of Gross Regional Product
Direct Effect	2,341.5	7%	\$156,006,946	6%	\$373,171,666	14%
Indirect Effect	420.9	1%	\$30,724,719	1%	\$63,244,893	2%
Induced Effect	348.1	1%	\$24,065,040	1%	\$41,438,896	2%
Total Effect	3,110.5	10%	\$210,796,705	8%	\$477,855,455	17%

As shown in the above table, agriculture, food, and food processing supports 3,110.5 jobs, or 10% of the entire workforce in the county. These industries provide a total economic contribution of approximately \$478 million, roughly 17% of Gross Region Product (GRP). As noted below in the calculation of Gross Regional Product, imports and institutional sales are subtracted. Therefore, counties that import a relatively large amount of goods and services will have a reduced GRP which may lead to agricultural output being greater than GRP.

Another metric used to calculate the importance of sectors in an economy is their value added as a percentage of GRP. Total value added by the 19 agriculture, food, and food processing sectors is approximately \$211 million, or 8% of the GRP. This indicates that personal income, business income, and taxes generated by these sectors account for 8% of the total economy.

The following tables document the overall summary numbers of the model, top industries affected by employment and output, and a listing of all industries that were analyzed.

<sup>1</sup> Article on building a contribution analysis in IMPLAN that avoids double counting:  
[https://implan.com/index.php?option=com\\_content&view=category&id=19](https://implan.com/index.php?option=com_content&view=category&id=19)

<sup>2</sup> Direct, indirect, and induced effects sum together to estimate the total economic contribution in the state. **Direct effects** capture the contribution from agricultural and food products. **Indirect effects** capture the economic benefit from farms and agricultural businesses purchasing inputs from supporting industries within the state. **Induced effects** capture the benefits created when employees of farms, agricultural businesses, and the supporting industries spend their wages on goods and services within the state.

<sup>3</sup> Value Added = Labor Income + Indirect Business Taxes + Other Property Type Income

<sup>4</sup> GRP = Final Demand of Households + Governments Expenditures + Capital + Exports - Imports - Institutional Sales

<sup>5</sup> Output = Intermediate Inputs + Value Added

In the top ten by employment, Beef cattle ranching and farming, including feedlots and dual-purpose ranching and farming is the top employer in the agriculture industry with 729.4 employees. This table also shows the amount of jobs that are created by the agriculture industry in Butler County.

#### Top 10 Industries Affected by Employment

Sector Description:	Total Employment	Total Output
Beef cattle ranching and farming, including feedlots and dual-purpose ranching and farming .....	729.4	\$154,748,219
Landscape and horticultural services .....	531.1	\$32,869,018
Veterinary services .....	314.1	\$18,117,919
All other crop farming.....	269.1	\$27,957,471
Grain farming .....	200.1	\$57,355,266
Animal production, except cattle and poultry and eggs.....	167.1	\$13,862,563
Real estate.....	101.8	\$15,332,700
Dairy cattle and milk production.....	99.4	\$15,151,275
Support activities for agriculture and forestry .....	94.9	\$5,041,156
Bread and bakery product, except frozen, manufacturing .....	32.3	\$3,553,253

The Beef cattle ranching and farming, including feedlots and dual-purpose ranching and farming industry directly contributes approximately \$155 million to Butler County's economy. This table also shows how much revenue is generated in other industries by having a strong agriculture industry.

#### Top 10 Industries Affected by Output

Sector Description:	Total Employment	Total Output
Beef cattle ranching and farming, including feedlots and dual-purpose ranching and farming .....	729.4	\$154,748,219
Grain farming .....	200.1	\$57,355,266
Landscape and horticultural services .....	531.1	\$32,869,018
All other crop farming.....	269.1	\$27,957,471
Oilseed farming .....	12.6	\$22,402,129
Animal, except poultry, slaughtering.....	28.1	\$21,754,919
Veterinary services .....	314.1	\$18,117,919
Real estate.....	101.8	\$15,332,700
Petroleum refineries.....	1.5	\$15,234,799
Dairy cattle and milk production.....	99.4	\$15,151,275

Below is a summary of all agriculture data with employment levels and output level. These values can tell how many jobs are represented by each agriculture sector and the output they contributed to Butler County's economy.

[illegible]

All 105 counties in Kansas have IMPLAN models with an agriculture contribution summary. These values do not factor in the retail environment of food sales. Food retail is important, but in order to provide the most accurate picture of what production agricultural and processing contributes to Kansas, the retail sector was omitted.